

## Special Issue

# Polarimetric Radar: Theory, Technology and Applications

### Message from the Guest Editors

This Special Issue aims to present a comprehensive collection of cutting-edge research and reviews that advance the fundamental theory and enabling technologies of polarimetric radars, and demonstrate their innovative applications within the broad scope of remote sensing. We are particularly interested in works that push the boundaries of current polarimetric theory, introduce target detection, target resolution, or target identification, or demonstrate its advanced applications in terrestrial, atmospheric, oceanic, and planetary observation. Contributions that integrate polarimetric data with other remote sensing sources or address critical challenges in calibration/validation are also welcome.

- The modeling and characteristic analysis of polarization scattering mechanism.
- Polarimetric detection.
- Polarimetric resolution.
- Polarimetric identification.
- Calibration and validation techniques.
- The analysis of target polarimetric scattering properties.
- Polarimetric SAR (PoISAR) and interferometric PoISAR (PolInSAR).
- Machine learning and deep learning for polarimetric feature extraction and recognition.
- Meteorological and atmospheric applications.
- Earth and environmental applications.

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### Guest Editors

Dr. Fulai Wang

Dr. Chen Pang

Dr. Xu Cheng

Dr. Zhanling Wang

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### Deadline for manuscript submissions

30 September 2026



## Remote Sensing

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CiteScore 8.6



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### Message from the Editorial Board

*Remote Sensing* is now a prominent international journal of repute in the world of remote sensing and spatial sciences, as a pioneer and pathfinder in open access format. It has highly accomplished global remote sensing scientists on the editorial board and a dedicated team of associate editors. The journal emphasizes quality and novelty and has a rigorous peer-review process. It is now one of the top remote sensing journals with a significant Impact Factor, and a goal to become the best journal in remote sensing in the coming years. I strongly recommend *Remote Sensing* for your best research publications for a fast dissemination of your research.

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### Editors-in-Chief

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